

# AMMOMASTER SINGLE-STAGE RELOADING PRESS

Safety and Operating Instructions

# SAFETY

Reloading is an enjoyable and rewarding hobby that is easily conducted with safety. But, carelessness or negligence can make reloading hazardous. This product has been designed from the beginning with the user's safety in mind.

As with any reloading operation, some safety rules must be followed. By observing these few rules, the chance of a hazardous occurrence causing damage or injury becomes extremely remote.

### **GENERAL**

- Use the reloading equipment as the manufacturer recommends. Study the instructions carefully and become thoroughly familiar with the operation of the tool. Don't take short cuts.
- Observe "good housekeeping" in the reloading area. Keep tools and components neat, clean and orderly. Promptly and completely clean up primer and powder spills.
- Reload only when you can give your undivided attention. Do not reload when fatigued or ill.
   Develop a reloading routine to avoid mistakes. Avoid haste load at a leisurely pace.
- Always wear adequate eye protection. You assume unnecessary risk when reloading without wearing safety glasses.

### LOADING DATA

- Use only laboratory tested reloading data. We highly recommend the use of the SPEER Reloading Manual.
- OBSERVE ALL WARNINGS ABOUT THE USE OF MAXIMUM LISTED LOADS.

### PRIMERS AND POWDER

- WARNING: Primers are designed to explode and will do so when subjected to heat, impact or static electricity.
- Do not decap live primers.
- Never attempt to seat or reseat a primer in a loaded round.
- Store primers and powder beyond the reach of children and away from heat, dampness, open flames and electrical equipment.
- DO NOT use primers of unknown identity. To destroy unwanted primers, soak in oil for a few days.
- Keep primers in original factory container until ready to use. Return unused primers to the same factory packaging for safety and to preserve their identity.
- DO NOT store primers in bulk. The blast of just a few hundred primers is sufficient to cause serious injury to anyone nearby.
- DO NOT force primers. Use care in handling primers.
- DO NOT use any powder unless its identity is positively known. Discard all mixed powders and those of uncertain or unknown identity.
- If you use a powder measure, replace the lids on both the powder hopper and powder can after the powder hopper has been filled.
- Before charging cases, settle the powder in the powder hopper. Throw and check the weight of at least ten charges. This will assure that the correct powder charge is being thrown.
- After a reloading session ends, pour the remaining powder back in its original factory container.
   This will preserve the identity and shelf life of the powder.
- DO NOT smoke while handling powder or primers.

### RECORD KEEPING

 Keep complete records of reloads. Apply a descriptive label to each box showing the date produced, and the primers, powder and bullet used. Labels for this purpose are packed with SPEER bullets.

Since RCBS has no control over the choice of components, the manner in which they are assembled, the use of this product or the guns in which the resulting ammunition may be used, no responsibility either expressed or implied, is assumed for the use of ammunition reloaded with this product.

### **GENERAL INFORMATION**

The single-stage version of AmmoMaster is a big, strong press that provides the experienced or beginning handloader with all the clearance, strength, and leverage to reload all rifle and pistol calibers. With the RCBS legendary compound leverage system and massive 1 1/2" ram, AmmoMaster will form cases or swage bullets. The 7/8-14 top thread allows the use of standard reloading dies and many RCBS accessories. With 7" between the top plate and the main press frame, AmmoMaster will easily handle the longest standard cartridge and with the addition of an optional .50 Cal Kit, AmmoMaster will even reload .50 BMG. And, when you're ready for high-volume reloading, AmmoMaster can be converted to a 5-station progressive reloading tool.

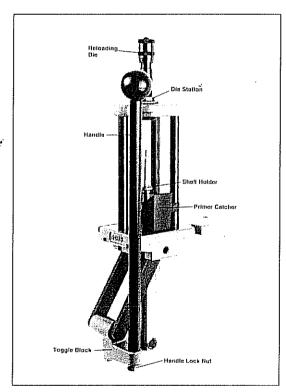
### UNPACKING

Unpack the press carefully and look for the items listed below. Refer to the parts list for identification.

- Press
- Handle and handle nut
- Primer catcher
- Ram Priming Unit
- · Case Lube-2 Resizing Lubricant

### INSTALLATION

Mount the AmmoMaster Press to a sturdy workbench or table with three bolts of sufficient length to penetrate the press base and bench. Install the threaded portion of the handle through the toggle block as shown in Photo #1. Attach the handle nut and tighten firmly. The handle nut must remain tight at all times to avoid damage to the handle and toggle. To correctly position the primer catcher, snap it onto the rear post as shown. Spent primers drop through the partially hollow ram and into the primer catcher. The AmmoMaster ram accepts removable type shell holders. To install a shell holder, insert it into the shell holder adaptor until it snaps into place.





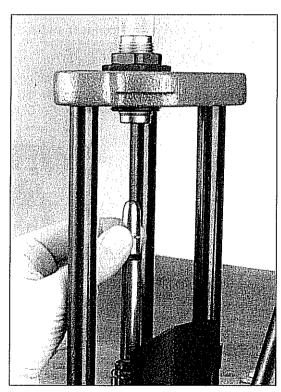


Photo #2

## **WARNING**

TO AVOID INJURY, READ AND FOLLOW THESE SAFE PRIMING PRACTICES.

DO NOT ATTEMPT TO PRIME MILITARY CARTRIDGE CASES WITH CRIMPED PRIMER POCKETS UNTIL THE CRIMP HAS BEEN REMOVED WITH A COUNTER SINK, A SPECIAL REAMER OR BY SWAGING. PRIMERS SEATED INTO CRIMPED POCKETS ARE SUBJECT TO DEFORMATION WHICH CAN CAUSE MISFIRES AND EVEN DETONATION DURING SEATING WHICH CAN CAUSE SERIOUS PERSONAL INJURY.

DO NOT ATTEMPT TO SEAT PRIMERS AGAINST EXCESSIVE RESISTANCE WHICH MIGHT CAUSE DETONATION AND POSSIBLE SERIOUS PERSONAL INJURY. CHECK TO BE CERTAIN THAT THE CASE WAS NOT PREVIOUSLY PRIMED, THAT THE FIRED PRIMER WAS REMOVED, THAT A PORTION OF THE PRIMER CUP WALL MIGHT STILL BE IN THE PRIMER POCKET AND THAT YOU ARE USING THE CORRECT SIZE PRIMER.

DO NOT MODIFY THE PRIMING SYSTEM IN ANY MANNER OR ATTEMPT TO USE SIMILAR PARTS OR PRIMING SYSTEMS FROM OTHER MANUFACTURERS. TO DO SO COULD RESULT IN PRIMER DETONATIONS RESULTING IN SERIOUS PERSONAL INJURY.

NEVER SEAT A PRIMER INTO A POWDER CHARGED CASE.

DECAPPING LIVE PRIMERS IS EXTREMELY DANGEROUS AND IS NOT RECOMMENDED.

### **PRIMING**

As described earlier, AmmoMaster is supplied with a Ram Priming Unit. There are two ways to prime with this accessory. One is called "seating primers by feel" and the other is called "seating primers to a positive stop." Priming should be accomplished by following either procedure consistently. "Seating primers by feel" is generally used when you are reloading cases from various manufacturers. The "seating cases to a positive stop" technique can be used when you are using matched brass. That is, brass of the same make and vintage.

The installation and operational procedure to "seat primers by feel" is as follows:

- 1. Remove the conventional shell holder from the ram.
- 2. Install the primer rod holder in the ram.
- 3. Thread the ram priming body into the press, positioning it so the hex lock nut is even with the top of the threads of the body and so the shell holder slot is facing the front. Secure by tightening the 7/8-14 hex lock nut. See Photo #3.
- 4. Insert the appropriate shell holder into the ram priming body. See Photo #4.
- 5. Assemble the large or small primer rod assembly as follows: Select the correct primer plug and sleeve (large or small). Drop the primer plug through the sleeve. Place the spring on top of the primer rod. Thread the primer plug into the top of the primer rod. Tighten the assembly with a small nail or straightened paper clip through the hole in the primer plug. Do not over-tighten.
- 6. Position the ram at the top of its stroke and drop the primer rod assembly through the shell holder. It should come to rest extending approximately 1/2 inch above the shell holder.



Photo #3



Photo #4

To prime, simply place the primer into the extended primer rod assembly. See Photo #5. Raise the operating handle slightly so that the primer rod assembly has dropped below the shell holder level. Insert a deprimed cartridge case and lower the operating handle until the primer is seated. See Photo #6.

Proper primer seating requires that the primer be seated between .002 inch and .004 inch below the case head. Either insufficient or excessive primer seating depth greatly decrease primer sensitivity and can result in misfires. Due to the mechanical advantage of this press, it is possible to over-seat or crush primers. Care must be exercised until you learn the proper "feel."

The installation and operational procedure to "seat primers to a positive stop" is as follows:

- 1. Repeat steps 1-6 as outlined above.
- 2. Loosen the hex lock nut and unscrew the ram priming body approximately 1/2 inch until the proper primer seating is achieved exactly at the end of the ram stroke. Proper adjustment can be achieved only by trial and error.
- Subsequent primer seating depth using the "seating primers to a positive stop" method will vary only as much as the variation in the rim thickness of your cartridge cases.

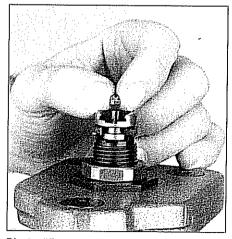


Photo #5

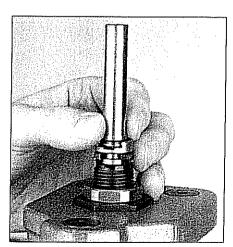
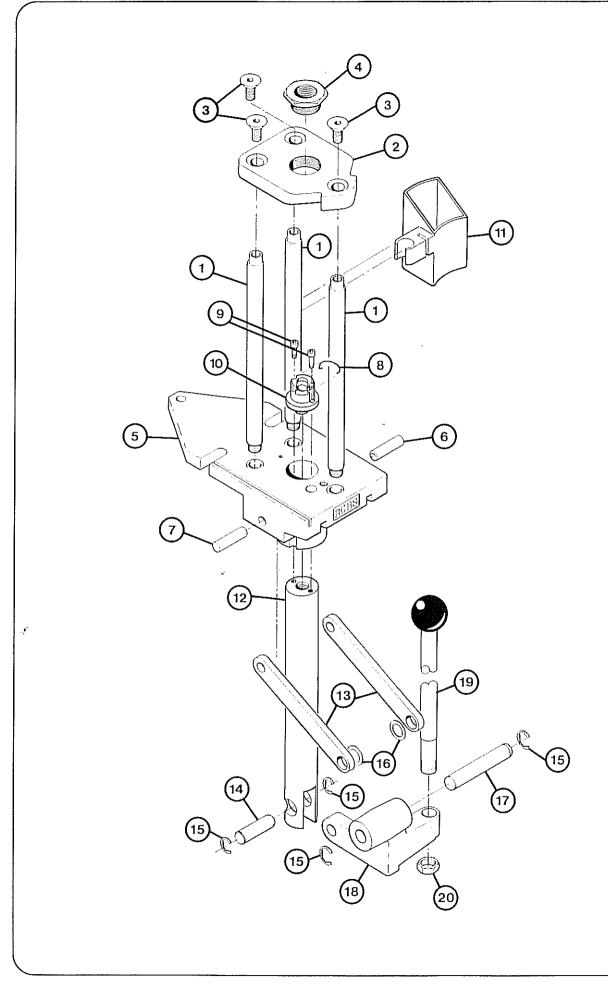


Photo #6



# AMMOMASTER SINGLE-STAGE RELOADING PRESS PARTS LIST

KEY	PART #	DESCRIPTION
1	88722	Support Rod (3)
2	88740	1-1/4" Top Plate
3	88750	3/8-16 x 3/4 FHSS (3)
4	09138	Bushing
5	88710	Base
6	09128	Link Pin, Right
7	09127	Link Pin, Left
8	09111	Ram Clip Spring
9	87159	SHCS 1/4-28 x 3/4 (2)
10	88715	Shell Holder Adaptor
11	88732	Primer Catcher
12	88714	Ram
13	88719	Linkage Arms (2)
14	87166	Ram Pin
15	09105	1/2" Retaining Ring (4)
16	09144	Bow Washer (2)
17	88712	Toggle Block Pin
18	88711	Toggle Block
19	86857	Handle
20	09136	Handle Lock Nut
*	09165	Ram Priming Unit
*	09335	Case Lube-2

<sup>\*</sup> Not Shown

### DIE INSTALLATION

Refer to the instructions received with your reloading die set for the proper installation of dies. Adjust the dies the same as you would in any single-stage press. See Photo #7 and Photo #8.

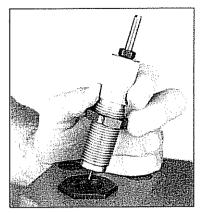


Photo #7

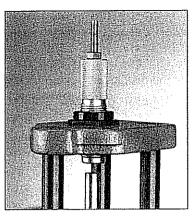


Photo #8

### **MAINTENANCE**

This press was lubricated when assembled at the factory. However, it is necessary to lightly lubricate all moving parts from time to time with a light oil such as Outers Gun Oil. If rust spots appear, swab lightly with gun oil and wipe dry. Care should be taken not to apply oil where it could come in contact with primer pockets or primers. Oil will deactivate primers. It is a good practice to clean the press prior to lubrication to remove grit and other residue. You will note the ease at which the epoxy enamel paint wipes clean. This finish is impervious to oil and is extremely chip and fade resistant. Remember, if you need technical assistance or reloading information, just give us a call. Our tolf-free and regular phone numbers are listed below.



We think that we make the very best reloading equipment in the world.

If you agree, please tell your friends.

If you disagree, tell us – we want to do something about it!

For Customer Service call toll free: 1-800-533-5000.

Hours: Monday -Thursday 6:30 a.m. - 4:00 p.m. Pacific Time.

SPORTING EQUIPMENT DIVISION OF BLOUNT, INC. RCBS Operations, 605 Oro Dam Blvd., Oroville, CA 95965

Form #200451-0191